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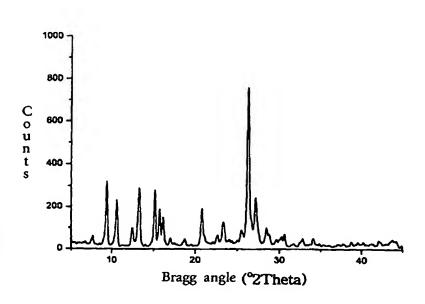
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(54) Title: METHOD FOR PREPARING OXYTITANIUM PHTHALOCYANINE CHARTGE GENERATING MATERIAL AND APPARATUS FOR PREPARING THE SAME



(57) Abstract: Disclosed herein are a method and an apparatus for preparing oxytitanium phthalocyanine as a charge generating material. The method comprises the steps of homogeneously mixing an oxytitanium phthalocyanine crude with an organic solvent while microwave energy having afrequency of 0.1~100 GHz and a power of 10~3,000W and ultrasonic wave energy having a frequency of 1~1,000kHz and a power of 10~5,000W are applied thereto, and reacting the mixture at 30~100°C for 0.5~5 hours. The apparatus comprises: a magnetron 1 capable of generating a frequency of 0.1~100GHz and a power of 100~3,000W; a mode stirrer 3 for making the wavelength of microwaves uniform in a microwave container 2; a PID type temperature controller 9 for accurately measurement and controlling the temperature of reactants; a K-type

thermocouple shielded from microwaves 4; a condenser 5; an agitator 6, the thermocouple 4, the condenser 5 and the agitator 6 being inserted into three openings formed at a top of the microwave container 2; an ultrasonic tip 7 inserted into an opening formed at a bottom of the microwave container 2; a Pyrex container 9 into which the reactants are introduced; and a solvent tank 10. According to the method and the apparatus, an oxytitanium phthalocyanine charge generating material having superior thermal stability and crystal stability can be prepared in an efficient manner.



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